has been much discussed whether neurones are in protoplasmic continuity with one another. It is really a question of very minor importance. In whichever sense it be answered, the fact remains that each neurone must, according to excellent evidence, be regarded as in some sense and degree an independent vital unit, as having unity and wholeness.

Consider the great fact displayed more clearly by neurones than by cells of other kinds—namely, that after separation of any part of a neurone from its nucleated cell-body, that part degenerates and dies away. It is a familiar occurrence, just because all the long cord-like nerves of our limbs and other parts consist of bundles of nerve threads or fibres, each of which is a part of a neurone. After such separation (such as occurs in almost every wound) the remaining nucleated cell-body can, and often does, put out a new fibre, growing in many cases along the tracks of the degenerated fibre, and thus restoring the anatomical and functional continuity of the system. But the neurone itself is unique among the various classes of cells in that, when any one neurone or group of neurones is killed or destroyed, the organism is incapable, it seems, of regenerating the part, of providing and specializing new neurones to take the places of those destroyed. This last peculiarity of the neurone seems to be one manifestation of its unique degree of specialization and individuality.

Further, the individuality of each neurone

is marked by the barrier which separates it, marks it off, and in some degree isolates it from every other neurone, even from those with which it is in the most intimate functional relations; the barrier known as the synaptic junction, a barrier which delays, obstructs, and modifies the passage